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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/273,468	03/22/1999	VLADIMIR VOLOKH	P-68422-US	7168
27130	7590	08/24/2004	EXAMINER	
EITAN, PEARL, LATZER & COHEN ZEDEK LLP 10 ROCKEFELLER PLAZA, SUITE 1001 NEW YORK, NY 10020			TSAI, HENRY	
			ART UNIT	PAPER NUMBER
			2183	

DATE MAILED: 08/24/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

09/273,468

Applicant(s)

VOLOKH, VLADIMIR

Examiner

Henry W.H. Tsai

Art Unit

2183

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136 (a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 9/2/03.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 11-20 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 11-20 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claims _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on _____ is/are objected to by the Examiner.
- 11) ☐ The proposed drawing correction filed on _____ is: a) ☐ approved b) ☐ disapproved.
- 12) ☐ The oath or declaration is objected to by the Examiner.

Priority under 35 U.S.C. § 119

- 13) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.
- 14) ☐ Acknowledgement is made of a claim for domestic priority under 35 U.S.C. § 119(e).

Attachment(s)

- 15) ☒ Notice of References Cited (PTO-892)
- 16) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 17) ☒ Information Disclosure Statement(s) (PTO-1449) Paper No(s) 4/13/04.
- 18) ☐ Interview Summary (PTO-413) Paper No(s) _____.
- 19) ☐ Notice of Informal Patent Application (PTO-152)
- 20) ☐ Other:

DETAILED ACTION

1. The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.

Claim Rejections - 35 USC § 102

(e) the invention was described in a patent granted on an application for patent by another filed in the United States before the invention thereof by the applicant for patent, or on an international application by another who has fulfilled the requirements of paragraphs (1), (2), and (4) of section 371(c) of this title before the invention thereof by the applicant for patent.

The changes made to 35 U.S.C. 102(e) by the American Inventors Protection Act of 1999 (AIPA) and the Intellectual Property and High Technology Technical Amendments Act of 2002 do not apply when the reference is a U.S. patent resulting directly or indirectly from an international application filed before November 29, 2000. Therefore, the prior art date of the reference is determined under 35 U.S.C. 102(e) prior to the amendment by the AIPA (pre-AIPA 35 U.S.C. 102(e)).

2. Claims 11-14, and 16-19 are rejected under 35 U.S.C. 102(b) as being anticipated by Guehring et al. (U.S. Patent No. 6,213,692), herein referred to as Guehring et al.'692.

Referring to claims 11 and 16, Guehring et al.'692 discloses as claimed a rotary multi-tooth milling cutter(1, see Fig. 1, note milling cutter is intended used as indicated in col. 1, lines 3-5) with at least one tooth including a lateral cutting

edge (22, at the periphery of flute 4 or 5, see Fig. 2) which rotates about a central cutter axis (27, see Fig. 1) and cuts generally parallel thereto, the tooth further including a tooth face (8, or 9 see Fig. 2) between the cutting edge (22, at the periphery of flute 4 or 5, see Fig. 2) and the central cutter axis (27, see Fig. 1), the tooth face (the face including 8 or 9 see Fig. 2) comprising: at least two sections between the cutting edge and central cutter axis, a first section (curved convex ridge near 22, see Fig. 2) nearest the cutting edge (22, at the periphery of flute 4 or 5, see Fig. 2) being convex and the second section (groove 18 portion, see Fig. 2) being concave.

As to claims 12 and 17, Guehring et al.'692 also discloses: the length of the first section (curved convex ridge near 22, see Fig. 2) on the tooth face is 20% or less than the length of the tooth face between the cutting edge (22, at the periphery of flute 4 or 5, see Fig. 2) and central cutter axis (27, see Fig. 1).

As to claims 13 and 18, Guehring et al.'692 also discloses: the first section (curved convex ridge near 22, see Fig. 2) blends tangentially into the second section (the groove 18 portion next to the curved convex ridge near 22, see Fig. 2).

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As to claims 14 and 19, Guehring et al.'692 also discloses: including a concave chip-breaking section (the groove 18 portion next to the curved convex ridge near 22, see Fig. 2) located between the first (curved convex ridge near 22, see Fig. 2) and second (the second groove 18 portion counted from the periphery of the tool 1, see Fig. 2) sections of the tooth face.

Claim Rejections - 35 USC § 103

3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

4. Claims 15 and 20 are rejected under 35 U.S.C. 103(a) as being unpatentable over Guehring et al.'692 in view of Noda et al. (U.S. Patent No. 5,454,670), herein referred to as Noda et al.'670.

Guehring et al.'692 discloses the claimed invention except for: the first section being smaller in length than the second section in the tooth face.

Noda et al.'670 discloses a rotary cutting tool (1, see Fig. 7) comprising the first section (14 see Fig. 5(a)) being smaller in length than the second section (the section with radius of curvature R1, see Fig. 5(a)).

It would have been obvious to one having ordinary skill in the art at the time the invention was made to modify Guehring et al.'692's tool to comprise the first section being smaller in length than the second section in the tooth face, as taught by Noda et al.'670, in order to facilitate the chip removal during the cutting process for the Guehring et al.'692's device.

Further, as shown in re Rose, 105 USPQ 237 (CCPA 1955), to make changes in size/range generally does not provide patentable weight to the claimed invention.

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Response to Arguments

5. Applicant's arguments filed 9/2/03 have been fully considered but they are not deemed to be persuasive.

Contact Information

6. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Dr. Henry Tsai whose telephone number is (703) 308-7600. The examiner can normally be reached on Monday-Thursday from 8:00 AM to 5:00 PM. If attempts to reach the examiner by telephone are unsuccessful, the examiner supervisor, Eddie Chan, can be reached on (703) 305-9712. Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the **TC 2100 receptionist whose telephone number is (703) 305-3900.**

7. In order to reduce pendency and avoid potential delays, Group 2100 is encouraging FAXing of responses to Office actions directly into

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the Group at fax number: 703-872-9306.

This practice may be used for filing papers not requiring a fee.
It may also be used for filing papers which require a fee by
applicants who authorize charges to a PTO deposit account.
Please identify the examiner and art unit at the top of your
cover sheet. Papers submitted via FAX into Group 2100 will be
promptly forward to the examiner.



HENRY W. H. TSAI
PRIMARY EXAMINER

August 20, 2004